

## Abstract

A system and method for propagating type information for hardware device nodes in a graphical program. A hardware device node may be any of various types of nodes relating to hardware devices and may perform any of various hardware-related functions in the graphical program, e.g., may access registers of a hardware device. After displaying a first hardware device node in the graphical program, the user may associate the first hardware device node with a hardware device. A second hardware device node may also be displayed in the graphical program, and the user may connect the first hardware device node to the second hardware device node. In response to connecting the first hardware device node to the second hardware device node, information may be propagated from the first hardware device node to the second hardware device node, wherein the information specifies the hardware device or device class with which the first hardware device node is associated. The second hardware device node may then be automatically, i.e., programmatically, associated with the same hardware device class with which the first hardware device node is associated. A method for performing type checking for a hardware device node in a graphical program is also described, e.g., to ensure that a method or property which the hardware device node is configured to invoke or access is a valid method or property for the hardware device or device class with which the hardware device node is associated.